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US Environmental Protection Agency
Docket ID No.EPA-HQ-OW-2007-1126
EPA Docket Center (EPA/DC)
Water Docket, MC 2822T
1200 Pennsylvania Avenue, NW
Washington, DC 20460

Dear Mr. Colianni:

We have reviewed the 11-9-07 Draft Gulf Hypoxia Action Plan (Draft Plan) and believe that this Draft Plan, as well as the 11-19-07 Draft Advisory Report of the Science Advisory Board (SAB) Hypoxia Panel (Draft Report) referenced in this Draft Plan, presents an unrealistic estimate of the relative contribution of point sources to nutrient loads delivered to the Gulf of Mexico. Specifically, the Draft Plan states:

> "Improved estimates of point and non-point source contributions are available: Newer information suggests that point sources represented 22% of nitrogen and 34% of phosphorus loads; resulting in a higher percentage of the total load to the Gulf from point sources than estimated in 1999." (Draft Plan, p. 15)

This statement is apparently taken from the Draft Report, in which similar statements can be found on pages 3, 7, 96, 98, 201-202, and 223. The Draft Report also makes a number of comments and recommendations—not explicitly addressed in the Draft Plan—that are likely based on a perceived increase in the point source component of nutrient loads delivered to the Gulf of Mexico. The SAB's December 2007 final report, *Hypoxia in the Northern Gulf of Mexico: An Update by the EPA Science Advisory Board* (Final Report), includes the same statements and indicates in the letter of transmittal that "point sources are a more significant contributor than previously thought."

However, as noted in our 11-9-07 letter of comment on the 11-5-07 SAB Draft Advisory Report, these estimates represent the unrealistic assumption of 100% delivery of all point source nutrient loads to the Gulf of Mexico. Such an assumption ignores the Draft Report's own findings:

> "[T]he percentage of annual N and P inputs removed by in-stream processes varies by MARB subbasin and ranges from 20 to 55% for N and 20 to 75% for P, based on model estimates." (Draft Report, p. 223)

> … "reservoirs can make a significant contribution to N removal in river networks." (Draft Report, p. 101)

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Only one of the seven Draft Plan and Draft Report statements referring to these new estimates acknowledges the assumption of 100% delivery of all point source nutrient loads to the Gulf of Mexico. Specifically, the Draft Report states—deep in the technical discussion:

> "These calculations also assume that the point source load is delivered to the NGOM without any in-stream losses. Therefore, they are the upper estimate for the contribution of point sources to the total N and total P riverine load." (Draft Report, p. 96)

All of the other statements, as well as related comments and recommendations, present these estimates uncritically and without acknowledging that they represent the upper bound of 100% delivery. The Draft Plan does note:

> "Additional analysis of detailed nutrient pollution contributions from multiple sectors, including point sources and non-agricultural contributions, needs to be undertaken. (Action 8 of 2001 Action Plan)." (Draft Plan, p. 12).

This suggests that the Draft Plan authors recognize that estimates need to be improved.

Recommendations for controls on watershed point sources based on overstated estimates of their relative contributions to nutrient loads delivered to the Gulf of Mexico may not be cost-effective and may not achieve the expected reductions in these delivered nutrient loads.

We urge that the Draft Plan, Draft Report and Final Report be modified so that all references made in regard to the point source contribution estimates either:

1) Include results from credible alternative analyses that bracket the estimates, or

2) Include the explicit acknowledgment that the estimates presented reflect the assumption that 100% of all point source nutrient loads in the MARB are delivered to the Gulf of Mexico, while scientific evidence suggests that the delivery ratio is considerably less.

Respectfully submitted,

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